

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions, and listing of claims in the application:

Listing of Claims

1. (Cancelled)

2. (Cancelled)

3. (Currently Amended) The method for manufacturing an adsorption apparatus as claimed in claim 13 adsorbent as claimed in claim 1, wherein the amount of the Fe³⁺ trivalent metal ion to be bonded to the apatite is in the range of 0.1 to 100 mg per gram of the apatite.

4. (Cancelled)

5. (Cancelled)

6. (Currently Amended) The method for manufacturing an adsorption apparatus as claimed in claim 13 adsorbent as claimed in claim 1, wherein the A is a fluorine element.

7. (Currently Amended) The method for manufacturing an adsorption apparatus as claimed in claim 13 adsorbent as claimed in claim 1, wherein the “x” in the formula is in the range of 0.3 to 1.

8. (Cancelled)

9. (Currently Amended) The method for manufacturing an adsorption apparatus as claimed in claim 13 adsorption apparatus as claimed in claim 8, wherein the adsorbent filling space is substantially fully filled with the adsorbent.

10. (Currently Amended) The method for manufacturing an adsorption apparatus as claimed in claim 13 adsorption apparatus as claimed in claim 8, wherein all the adsorbent contained in the adsorbent filling space has substantially the same composition.

11. (Cancelled)

12. (Cancelled)

13. (Currently Amended) A method for manufacturing an adsorption apparatus, the adsorption apparatus comprising a column having an adsorbent filling space, and an adsorbent filled into the adsorbent filling space of the column, wherein the adsorbent has a surface and comprises an apatite which forms at least the surface of the adsorbent, the apatite a solution containing a trivalent metal ion is passed through an adsorbent filling space of a column filled with an apatite represented by the formula $\text{Ca}_{10}(\text{PO}_4)_6((\text{OH})_{1-x}\text{A}_x)_2$, where A represents a halogen element and $0 \leq x \leq 1$, and Fe^{3+} bonded to a phosphate group contained in the apatite, and wherein the adsorbent has a particulate form and an average particle size of the adsorbent is in the range of 0.5 to 100 μm ,

the method comprising:

preparing the column by filling the filling space with the apatite; and

passing a solution containing Fe³⁺ through the adsorbent filling space of the column at a flow rate of 0.1 to 10 ml/min so that a phosphate group contained in the apatite is bonded to the Fe³⁺ and thereby obtaining the adsorbent trivalent metal ion.

14. (Original) The method for manufacturing an adsorption apparatus as claimed in claim 13, wherein the amount of the trivalent metal ion contained in 1 L of the solution is in the range of 1 to 50 mol per 1 mol of the apatite.

15. (Original) The method for manufacturing an adsorption apparatus as claimed in claim 13, wherein the total amount of the solution containing the trivalent metal ion to be passed through the adsorbent filing space is in the range of 1 to 50 mL.

16. (Cancelled)

17. (Cancelled)

18. (New) The method for manufacturing an adsorption apparatus as claimed in claim 13, wherein the solution comprises FeCl₃.